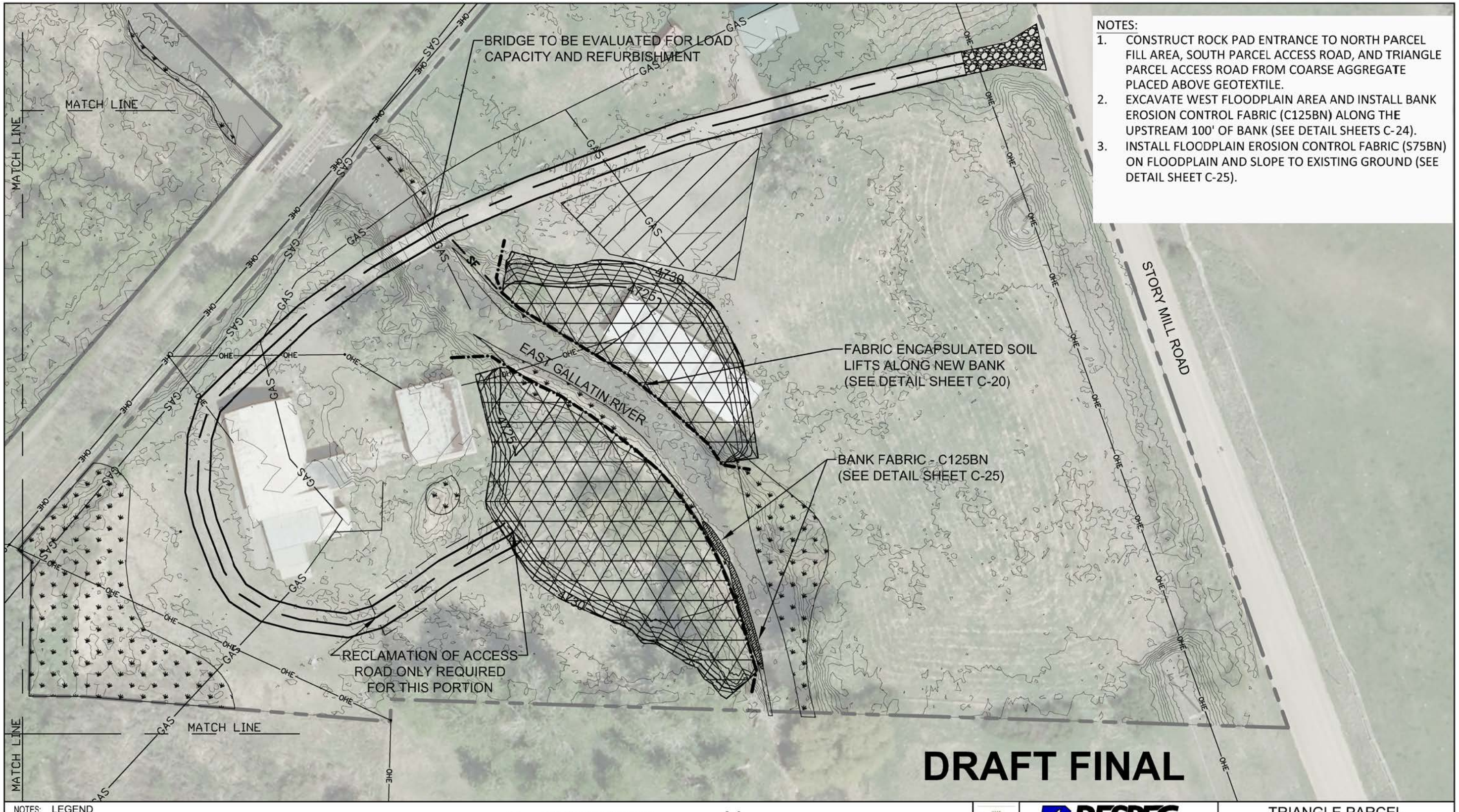
Story Mill - Design Figures



NOTES:

1. CONSTRUCT ROCK PAD ENTRANCE TO NORTH PARCEL FILL AREA, SOUTH PARCEL ACCESS ROAD, AND TRIANGLE PARCEL ACCESS ROAD FROM COARSE AGGREGATE PLACED ABOVE GEOTEXTILE.
2. EXCAVATE WEST FLOODPLAIN AREA AND INSTALL BANK EROSION CONTROL FABRIC (C125BN) ALONG THE UPSTREAM 100' OF BANK (SEE DETAIL SHEETS C-24).
3. INSTALL FLOODPLAIN EROSION CONTROL FABRIC (S75BN) ON FLOODPLAIN AND SLOPE TO EXISTING GROUND (SEE DETAIL SHEET C-25).

NOTES: LEGEND

- APPROXIMATE PROPERTY LINE
- EXTENT OF GRADING FOOTPRINT
- EXISTING GROUND CONTOUR - MAJOR
- EXISTING GROUND CONTOUR - MINOR
- PROPOSED GROUND CONTOUR - MAJOR
- PROPOSED GROUND CONTOUR - MINOR
- HAUL ROAD
- FIBER ROLL
- SF — SILT FENCE
- EROSION CONTROL FABRIC - S75BN
- STAGING AREA (OPTIONAL)
- ROCK PAD
- OHE — OVERHEAD ELECTRIC
- EXISTING WETLAND

N

0 60 120

FEET

CONTOUR INTERVAL = 1 FOOT

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TRIANGLE PARCEL
EXISTING CONDITIONS, STAGING, SPOIL AND EROSION & SEDIMENT CONTROL

		DATE: 05/2014	
DR.: JR	REFIN. JOB#: 02274	RSI DWG: _DES01_key_100.dwg	REV. --
CH.: MR	SCALE: 1" = 60'		
AP.: RM	SHEET: C-08		

NOTES:
1. REFURBISH BRIDGE DECKING TO ACCOMMODATE DUMP TRUCKS AND OTHER HEAVY EQUIPMENT.
2. EXCAVATE GRAVEL SUBSTRATE TO A DEPTH OF 1' FOR AREA SHOWN.
3. FURNISH AND GRADE TOPSOIL TO DEPTH OF 0.5' AND BLEND TO SURROUNDING TOPOGRAPHY.
4. CONSTRUCT FABRIC ENCAPSULATED SOIL LIFTS ALONG BANK OF EAST FLOODPLAIN AREA (SEE DETAIL SHEETS C-20 THRU C-23).
5. OVEREXCAVATE TO ACCOMMODATE A MINIMUM OF 6 INCHES OF SALVAGED TOPSOIL. FINAL GRADE WILL BE LEFT IN A LOOSE, ROUGHENED CONDITION, AS DIRECTED BY THE DESIGNER.

BRIDGE TO BE EVALUATED FOR LOAD CAPACITY AND REFURBISHMENT

Future Fisheries Treatment Area - Bank restoration with willow plantings incorporated into the bank lifts

FABRIC ENCAPSULATED SOIL LIFTS ALONG NEW BANK (SEE DETAIL SHEET C-20)

VARY DAYLIGHT SLOPE TO EXISTING GRADE MAX 2:1 (SEE DETAIL SHEET C-25)

EAST GALLATIN RIVER

STORY MILL ROAD

MATCH LINE

MATCH LINE

MATCH LINE

MATCH LINE

DRAFT FINAL

LEGEND
- APPROXIMATE PROPERTY LINE
- EXTENT OF GRADING FOOTPRINT
- EXISTING GROUND CONTOUR - MAJOR
- EXISTING GROUND CONTOUR - MINOR
- PROPOSED GROUND CONTOUR - MAJOR
- PROPOSED GROUND CONTOUR - MINOR
- TR — BANK TRASH REMOVAL
- OHE — OVERHEAD ELECTRIC
- W — WATER (10' BUFFER)
- BUILDING/STRUCTURE REMOVAL
- GRAVEL REMOVAL
- EXISTING WETLAND

N

0 60 120

FEET

CONTOUR INTERVAL = 1 FOOT

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TRIANGLE PARCEL RESTORATION DESIGN

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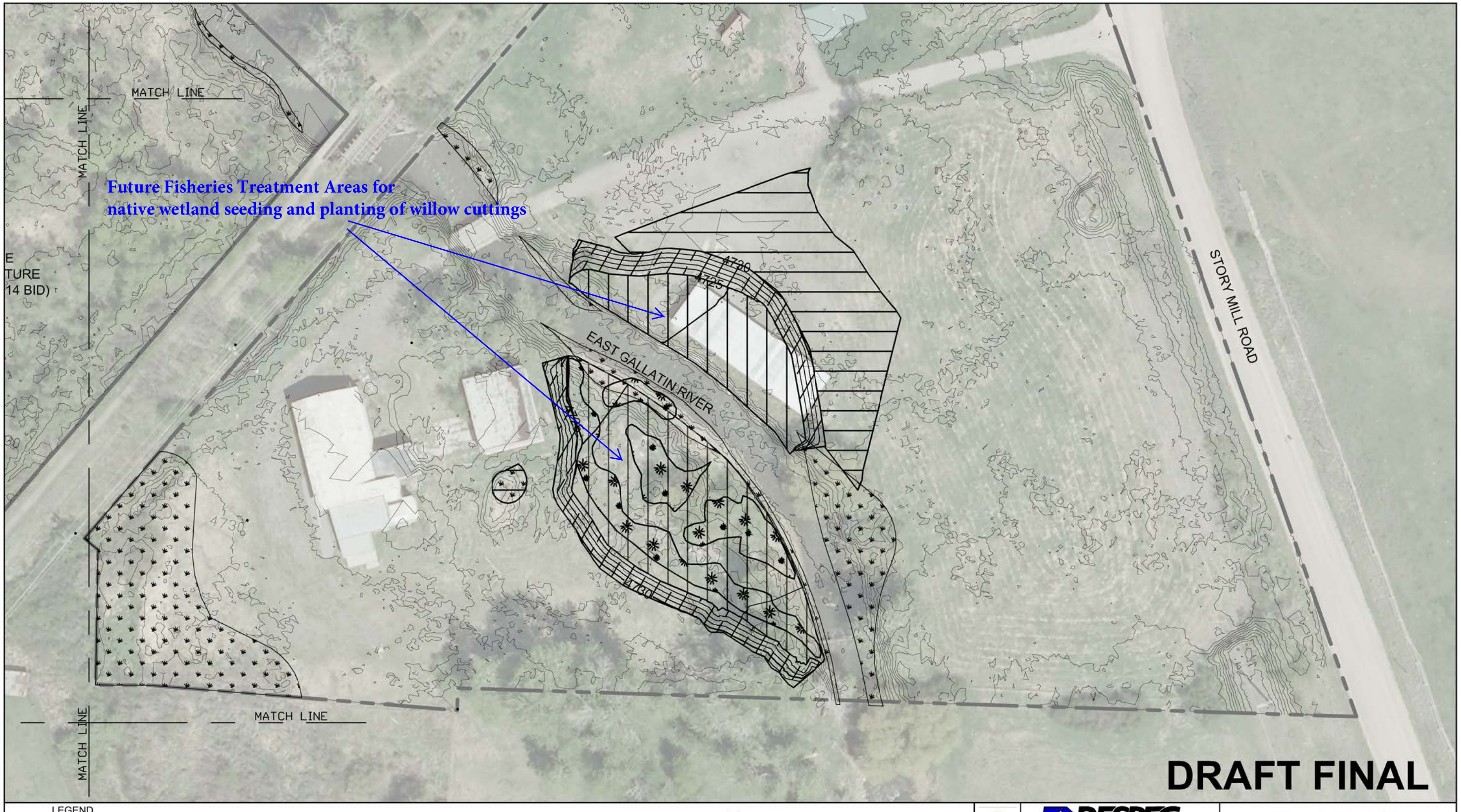
AP.: RM	SHEET: C-15		



LEGEND

- APPROXIMATE PROPERTY LINE
- EXTENT OF GRADING FOOTPRINT
- EXISTING GROUND CONTOUR - MAJOR
- EXISTING GROUND CONTOUR - MINOR
- PROPOSED GROUND CONTOUR - MAJOR
- PROPOSED GROUND CONTOUR - MINOR
- EXISITNG WETLAND
- WILLOW PLANTINGS
- WETLAND SEEDING
- RIPARIAN SEEDING
- UPLAND SEEDING

N

0 60 120

FEET

CONTOUR INTERVAL = 1 FOOT

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TRIANGLE PARCEL PLANTING PLAN

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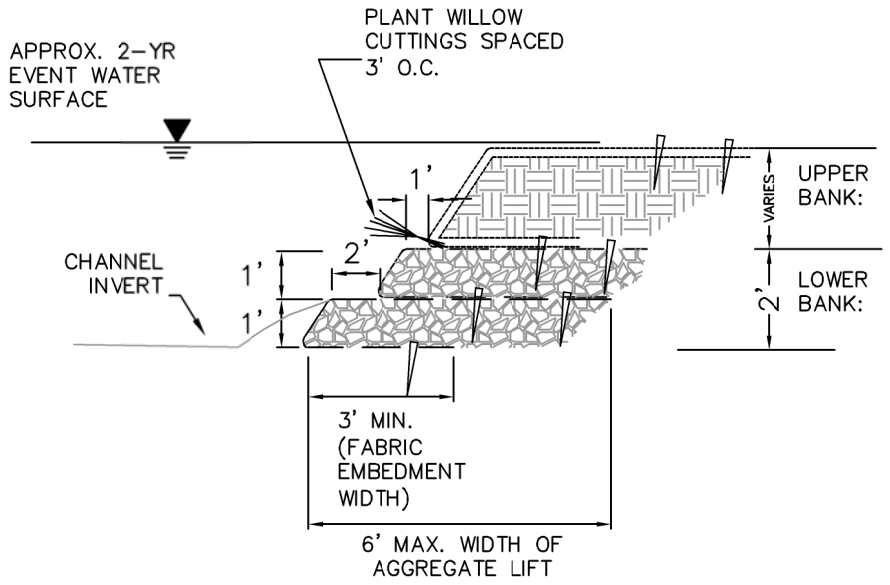
CH.: MR	SCALE: 1" = 60'	_DES01_key_100.dwg	--
AP.: RM	SHEET: P-07		

NOTES:
1. WOVEN COIR FABRIC MATERIAL TO BE 3 OZ/SQ. FT IN 9.8 FOOT WIDE ROLLS.
2. NON-WOVEN COIR FABRIC MATERIAL TO BE IN 6.6 FOOT WIDE ROLLS
3. CONSTRUCT AGGREGATE FILLED WRAPS AT BANK TOE IN LIFTS APPROXIMATELY 12" THICK.
4. PLANT DORMANT WILLOW CUTTINGS IN LAYER OF SOIL ON TOP OF AGGREGATE LIFT.
5. CONSTRUCT UPPER BANK LIFT OF NATIVE FILL MATERIAL AND TOPSOIL MIXTURE.
6. SEED UPPER BANK WITH RIPARIAN SEED MIX.
7. SEED TOP LIFT OF LOWER BANK WITH WETLAND SEE MIX.



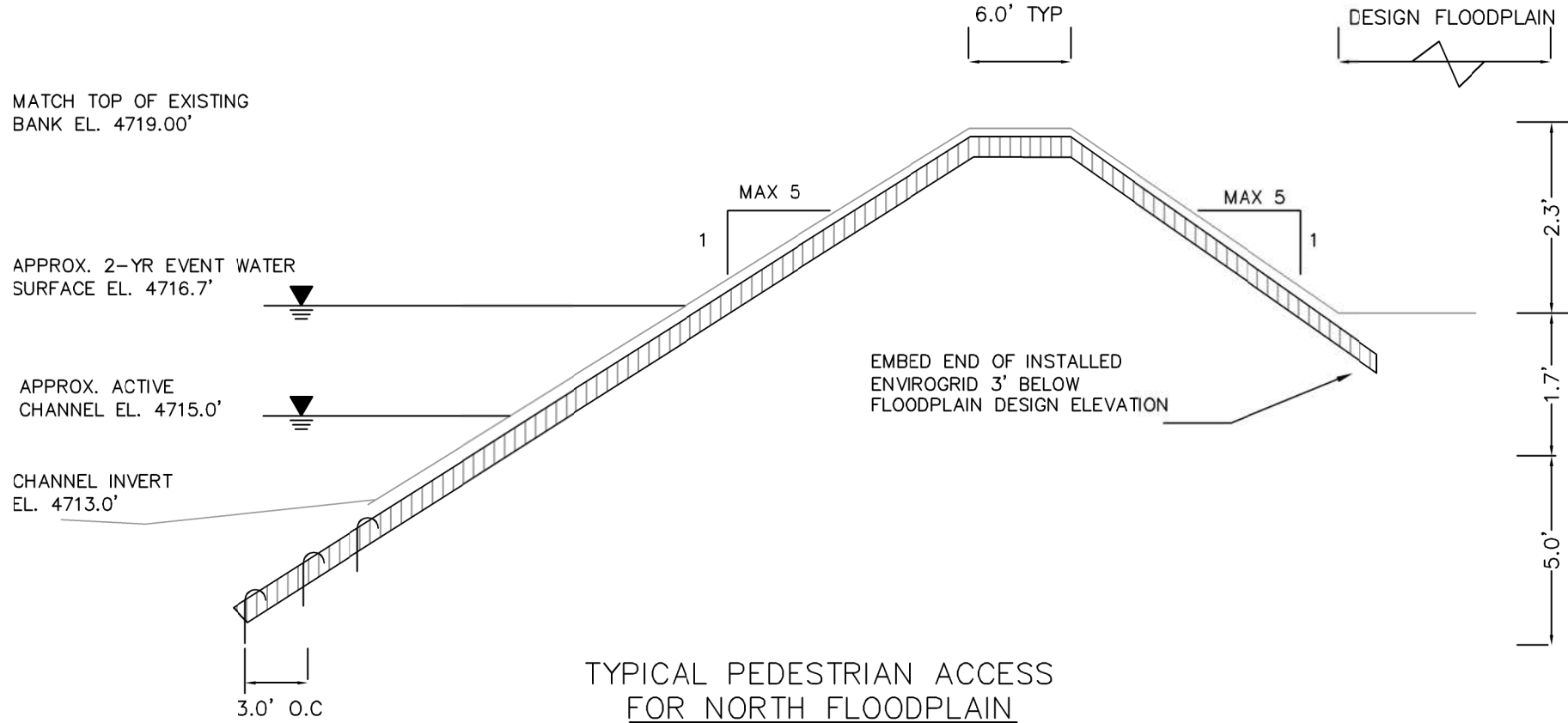
TIE-IN TO DESIGN FLOODPLAIN GRADE AT TOP OF BANK

OUTER LAYER OF WOVEN COIR FABRIC; INNER LAYER OF NON-WOVEN COIR FABRIC TO WRAP 50% NATIVE FILL, 50% FURNISHED TOPSOIL

4 INCH MINUS AGGREGATE FILL MATERIAL WRAPPED IN COCONUT (COIR) WOVEN EROSION CONTROL BLANKET (3 OZ/SQ. FT) OUTSIDE LAYER, AND NON-WOOVEN COIR FABRIC INSIDE LAYER (SEE DETAIL SHEET C-20). TOP LIFT OF LOWER BANK TO INCLUDE 50% NATIVE FILL MATERIAL BLENDED WITH 50% AGGREGATE. SEED WITH WETLAND SEED MIXTURE.

TYPICAL BANK TREATMENT FOR TRIANGLE PROPERTY RIGHT BANK

NOTES:
1. PEDESTRIAN ACCESS SITE TO CONSIST OF 3 PANELS WIDE BY 3 PANELS LONG OF ENVIROGRID EGA30 8" CELL DEPTH AND INSTALLED PER MANUFACTURER SPECIFICATIONS.
2. FINISHED GRADE OF ACCESS SITE TO BE FLUSH WITH ADJACENT UPSTREAM AND DOWNSTREAM LAND SURFACES.
3. ADJACENT SECTIONS OF ENVIROGRID TO BE JOINED WITH 5 INDUSTRIAL GRADE STAPLES PER CELL.
4. ANCHOR ENVIROGRID WITH 24" #4 REBAR J-HOOK STAKES OR ATRA ANCHOR SPACED 3' O.C. AND EVERY 3' ALONG PERIMETER.
5. INFILL MATERIAL TO INCLUDE A 3" CAP, SEEDED WITH RIPARIAN SEED MIXTURE ABOVE ACTIVE CHANNEL EL.
6. MATCH EXISTING GRADE AT TOP OF BANK ELEVATION TO BE MAINTAINED. SLOPE OF ENVIROGRID NOT EXCEED 5:1.
7. EXISTING MATURE WILLOW TREES ALONG PERIMETER TO REMAIN UNDISTURBED.
8. PLANT 2 ROWS OF COYOTE WILLOW CUTTINGS, ONE PER EACH CELL ALONG PERIMETER BETWEEN 2-YR EVENT ELEV. AND ACTIVE CHANNEL ELEV.
9. SEED INFILL MATERIAL WITH NEBRASKA SEDGE BETWEEN ACTIVE CHANNEL ELEV. AND DESIGN FLOODPLAIN.
10. COVER PLANTED AND SEEDED SITE WITH C125BN FABRIC (SEE DETAIL SHEET C-25).



INFILL ABOVE 2-YR EVENT/FLOODPLAIN DESIGN ELEVATION WITH SALVAGED NATIVE TOPSOIL

INFILL BETWEEN 2-YR EVENT AND ACTIVE CHANNEL TO CONSIST OF 50% NATIVE STREAMBED MATERIAL (DMAX = 2") AND 50% SALVAGED NATIVE TOPSOIL

INFILL BETWEEN ACTIVE CHANNEL TO BOTTOM OF INSTALLED GEOGRID TO CONSIST OF NATIVE STREAMBED MATERIAL (DMAX = 2")

TOP OF GEOGRID AT TOE OF SLOPE TO BE INSTALLED 3' BELOW CHANNEL INVERT ELEVATION

TYPICAL PEDESTRIAN ACCESS FOR NORTH FLOODPLAIN

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STORY MILL RESTORATION
TYPICAL DETAILS

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CH.: MR	SCALE: NTS		
AP.: RM	SHEET: C-20		

CONSTRUCTION SEQUENCE FOR FABRIC ENCAPSULATED SOIL LIFT

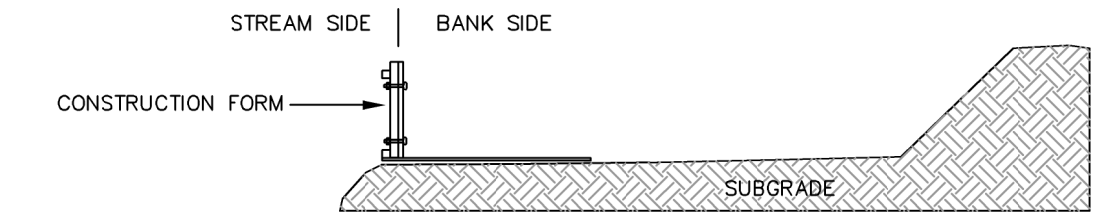

FIGURE A.

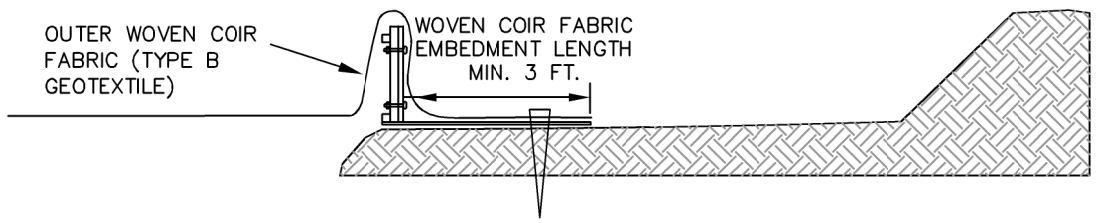

FIGURE B.

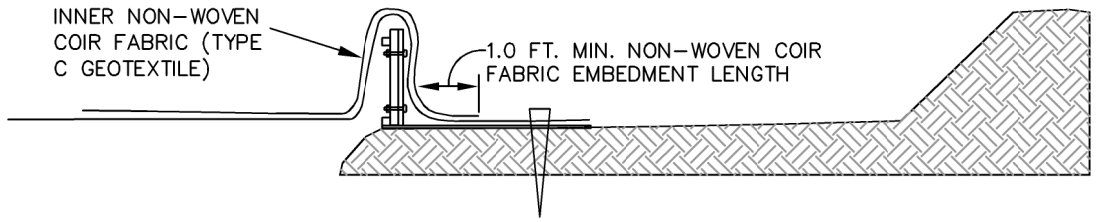

FIGURE C.

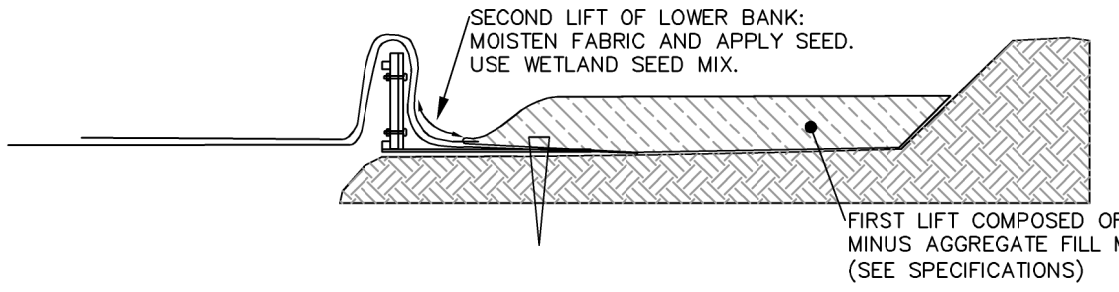

FIGURE D.

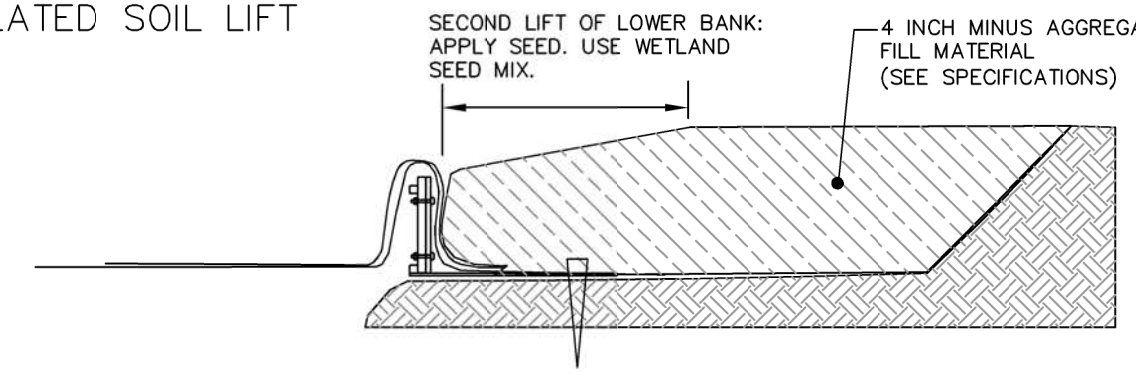

FIGURE E.

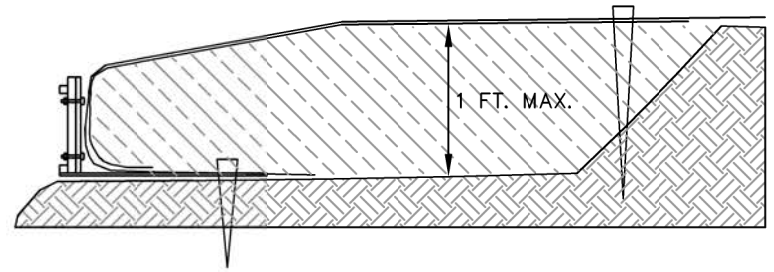

FIGURE F.

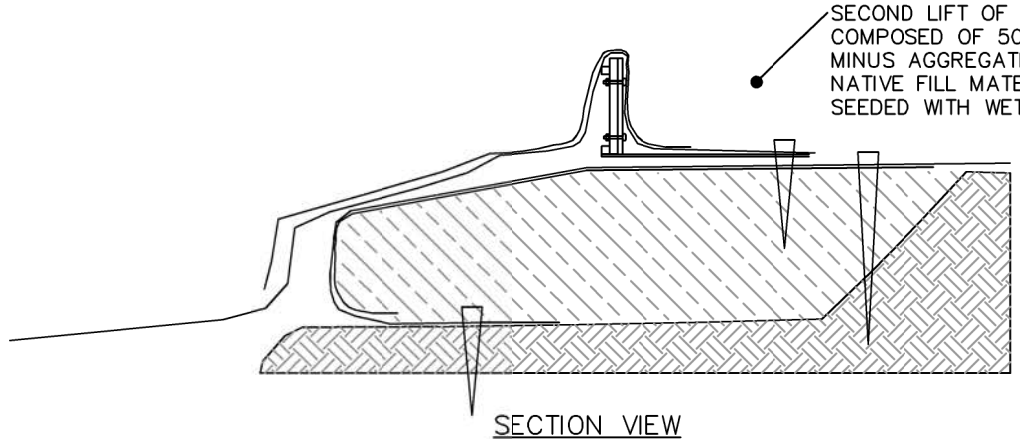

FIGURE G.

SECTION VIEW

GENERAL NOTES FOR CONSTRUCTING TRIANGLE PROPERTY EAST BANK FABRIC ENCAPSULATED SOIL LIFTS

1. BANKS MAY BE CONSTRUCTED IN EITHER AN UPSTREAM OR DOWNSTREAM DIRECTION, AS LONG AS THE FABRIC IS OVERLAPPED IN THE UPSTREAM TO DOWNSTREAM DIRECTION.
2. PLACE A SERIES OF THREE OR MORE FORMS ON THE SUBGRADE SO THAT THE FORMS FOLLOW THE PROPOSED STREAM BANK ALIGNMENT (FIGURE A). BUTT THE ENDS OF THE FORMS TIGHTLY TOGETHER.
3. UNROLL THE OUTER WOVEN COIR FABRIC, PARALLEL TO THE CHANNEL AND POSITION IT SO THAT 3 FT. EXTENDS FOR EMBEDMENT ON THE BANK SIDE OF THE FORMS (FIG B). DRAPE THE REMAINDER OF THE FABRIC OVER THE TOP OF THE FORMS ON THE STREAM SIDE (FIG B).
4. UNROLL THE INNER NON-WOVEN COIR FABRIC, OVER THE TOP OF THE OUTER FABRIC AND POSITION IT SO THAT AT LEAST 1 FT. OF THE INNER FABRIC EXTENDS AS AN EMBEDMENT LENGTH ON THE BANK SIDE OF THE FORMS (FIG C). DRAPE THE REMAINDER OF THE FABRIC OVER THE TOP OF THE FORMS ON THE STREAM SIDE AND ALIGN THE LONG EDGES OF THE INNER AND OUTER FABRICS. STRETCH AND PULL THE FABRIC LAYERS TO REMOVE WRINKLES.
5. PLACE TOPSOIL OVER THE FABRIC ON THE BANK SIDE OF THE FORMS THEN COMPACT. MOISTEN FABRIC AND SPRINKLE SEED ON FABRIC IN AREA INDICATED IN FIGURE D (TOP LIFT OF LOWER BANK ONLY). LEVEL THE TOPSOIL AND COMPACT TO 75 PERCENT STANDARD PROCTOR DRY DENSITY (SPDD) (FIG E).
6. FOLD THE LOOSE ENDS OF THE TWO FABRIC LAYERS BACK OVER THE COMPACTED TOPSOIL MATERIAL AND STRETCH TIGHTLY TO REMOVE WRINKLES (FIG F). SECURE WITH WOODEN STAKES AT A SPACING OF 3 FT.
7. REPEAT STEPS 1 THROUGH 6 FOR ADDITIONAL LIFTS.

NOTES:

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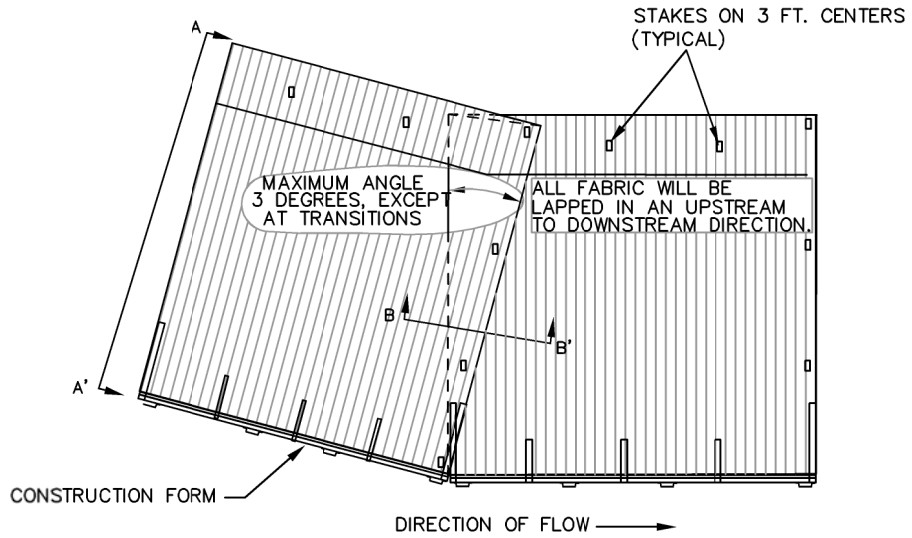
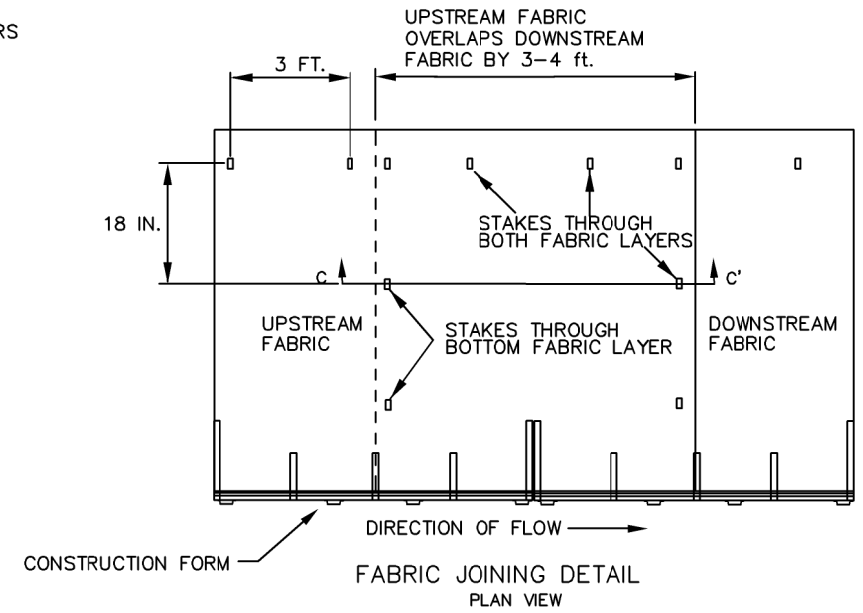
STORY MILL RESTORATION
TYPICAL DETAILS
FABRIC ENCAPSULATED (FES) LIFT

		DATE: 05/2014	
DR.: JR	REFIN. JOB#: 02274	RSI DWG NO. _DES01_Details_100.dwg	REV. --
CH.: MR	SCALE: NTS		
AP.: RM	SHEET: C-21		



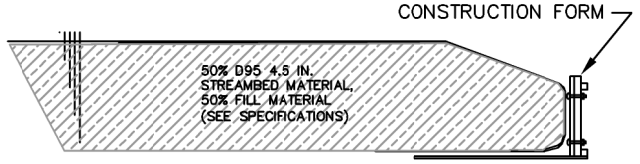
FOLDING OF CONTINUOUS SHEET FABRIC AT ANGLE

PLAN VIEW

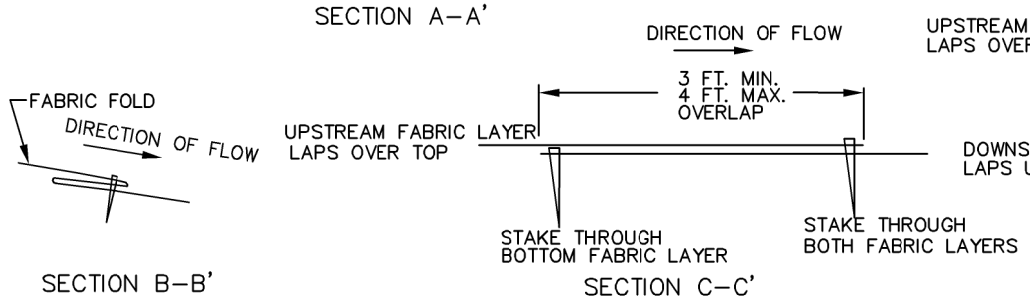


FABRIC JOINING DETAIL

PLAN VIEW

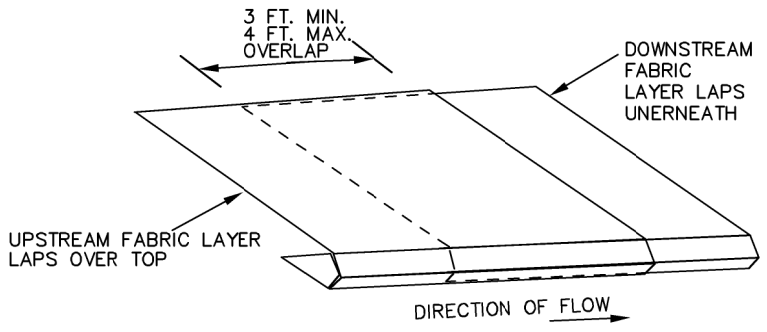


SECTION A–A'



SECTION B–B'

SECTION C–C'



ISOMETRIC

GENERAL NOTES ON SECURING FABRIC FOR FES LIFT TREATMENT

1. FORMS MAY BE ANGLED TO CREATE BENDS IN THE LIFTS AS NEEDED. FABRIC SHALL BE FOLDED AT EACH BEND AS SHOWN IN PLAN VIEW. NO BEND SHALL EXCEED A 3 DEGREE ANGLE, EXCEPT AT TRANSITIONS. FOLDS SHALL BE MADE IN AN UPSTREAM TO DOWNSTREAM DIRECTION. STAKE THE FOLDS AS SHOWN IN SECTION B–B'.

2. OUTER FABRIC ENDS SHALL BE JOINED BY LAPPING THE UPSTREAM PIECE OF FABRIC OVER THE DOWNSTREAM PIECE AS SHOWN IN PLAN VIEW. OVERLAPS SHALL BE A MINIMUM OF 3 FT. INNER FABRIC ENDS SHALL BE BUTTED TOGETHER, NOT OVERLAPPED. OVERLAPS SHALL BE STAGGERED FROM LIFT TO LIFT BY A MINIMUM OF 15 FT.

3. SECURE THE BANK SIDE EDGE OF THE OUTER FABRIC (WOVEN), WITH A WOODEN STAKE THROUGH THE FABRIC ON 3 FT. CENTERS (SEE PLAN VIEWS). NOTE: THE HOLES FOR STAKES SHALL NOT BE PRECUT. ALLOW THE STAKE TO BREAK THE MINIMUM NUMBER OF STRANDS AS IT IS BEING DRIVEN. DRIVE STAKES SO THAT A MAXIMUM OF 2 IN. IS LEFT EXPOSED.

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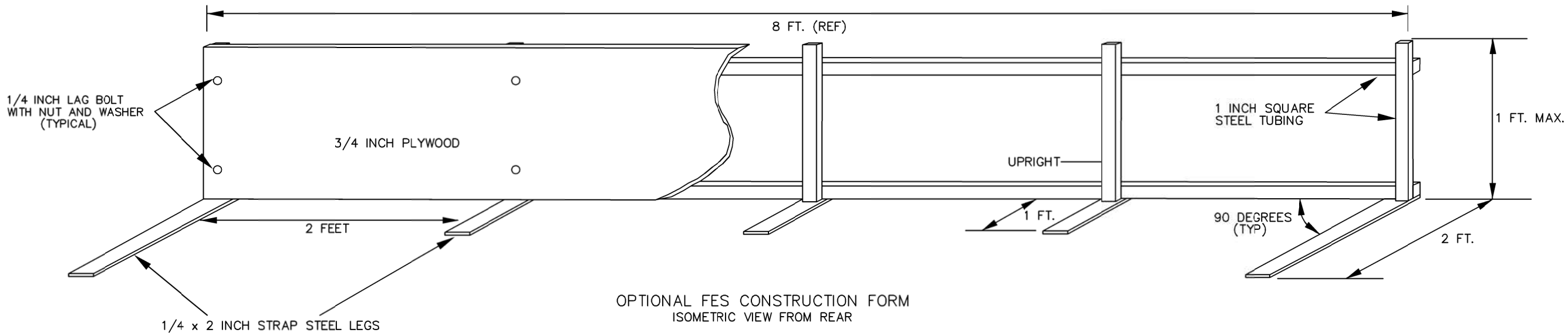
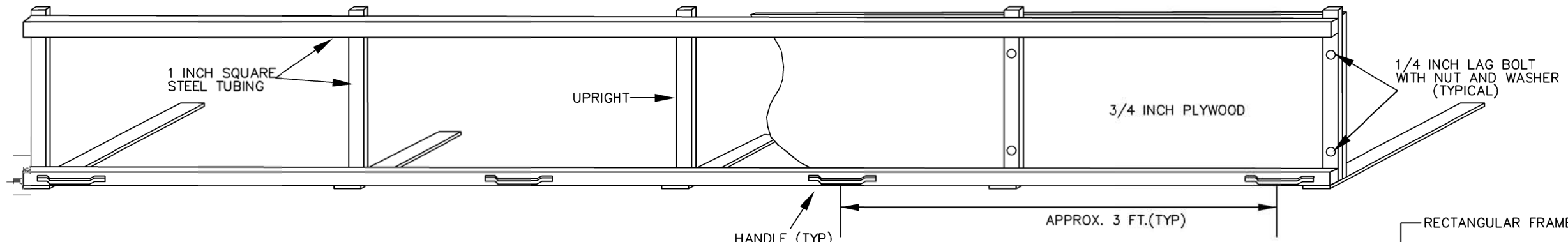
STORY MILL RESTORATION
TYPICAL DETAILS
FABRIC ENCAPSULATED (FES) LIFT

		DATE: 05/2014	
DR.: JR	REFIN. JOB#: 02274	RSI DWG NO. _DES01_Detail_100.dwg	REV. --
CH.: MR	SCALE: NTS		
AP.: RM	SHEET: C-22		

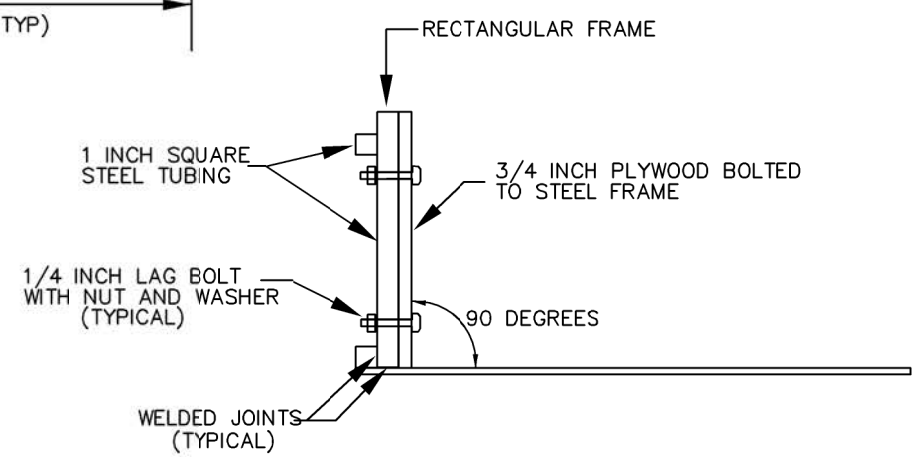


OPTIONAL FES CONSTRUCTION FORM
ISOMETRIC VIEW FROM REAR



OPTIONAL FES CONSTRUCTION FORM
ISOMETRIC VIEW FROM FRONT

NOTE: CONSTRUCTION FORMS MAY BE
SUBSTITUTED WITH REBAR AND 2" x 12" LUMBER



OPTIONAL FES BANK CONSTRUCTION
FORM END VIEW

NOTES:

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STORY MILL RESTORATION
TYPICAL DETAILS
FABRIC FORMS CONSTRUCTION DETAILS

		DATE: 05/2014	
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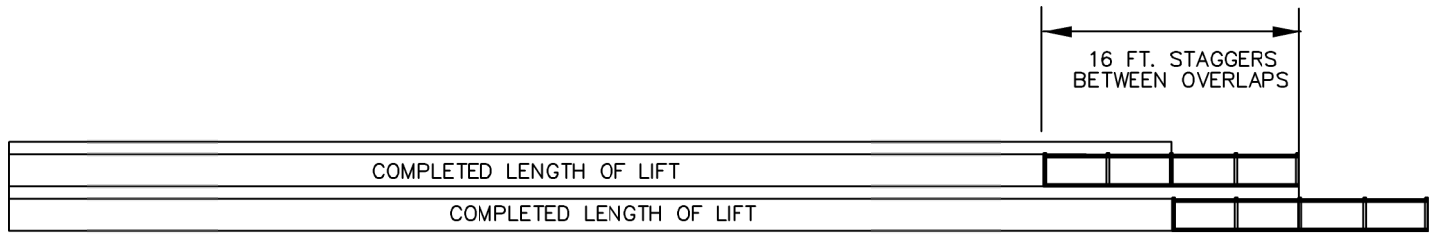
CH.: MR	SCALE: NTS		
AP.: RM	SHEET: C-23		

1. PLACE A ROW OF CONSTRUCTION FORMS ALONG DESIRED BANK ALIGNMENT FOR FIRST LIFT.

2. CONSTRUCT FABRIC ENCAPSULATED LIFTS ALONG LENGTH OF FIRST SET OF FORMS AND THEN BEGIN PLACEMENT OF FORMS AND CONSTRUCTION OF SECOND LIFT.

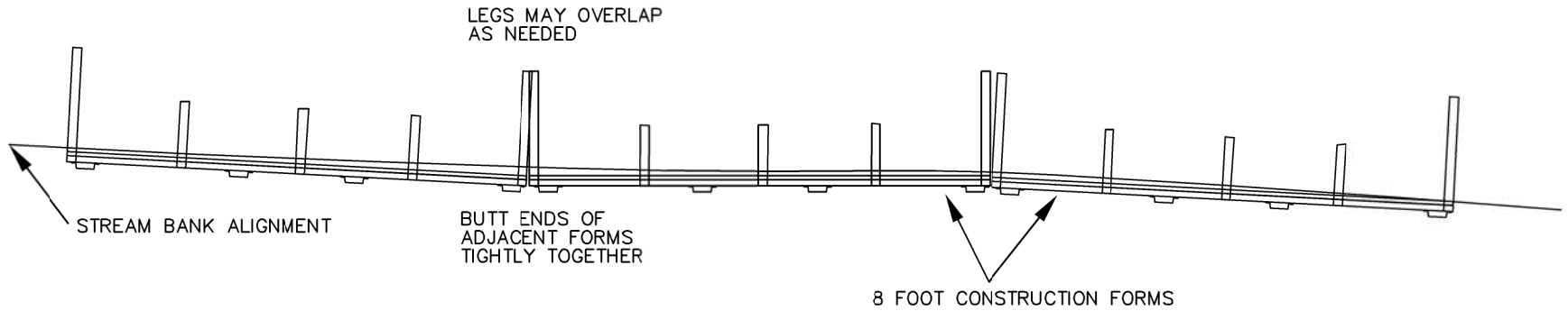


3. STAGGER FABRIC OVERLAPS A MINIMUM OF 16 FEET BETWEEN LIFTS.

GENERAL NOTES ON FABRICATION OF OPTIONAL FORMS FOR FABRIC ENCAPSULATED SOIL LIFT CONSTRUCTION

1. FABRICATE FORMS BY WELDING 1 INCH TUBULAR STEEL TOGETHER TO CREATE A 1x8 FOOT RECTANGULAR FRAMEWORK.
2. WELD LENGTHS OF 1/4x2 INCH STEEL STRAP AT 90 DEGREES TO THE FRAME EVERY 2 FEET.
3. ATTACH A PIECE OF 3/4 INCH PLYWOOD TO THE FRAME USING 1/4 INCH DIAMETER LAG BOLTS OR EQUIVALENT.
4. REMOVAL AND TRANSPORT OF THE FORMS IS FACILITATED IF HEAVY DUTY HANDLES ARE ATTACHED TO THE FRAME AS SHOWN.

SEQUENCE FOR PLACEMENT OF FORMS
PROFILE VIEW LOOKING INTO BANK



FABRIC ENCAPSULATED SOIL CONSTRUCTION FORM PLACEMENT
PLAN VIEW

NOTES:

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STORY MILL RESTORATION
TYPICAL DETAILS
FABRIC FORMS CONSTRUCTION DETAILS

		DATE: 05/2014	
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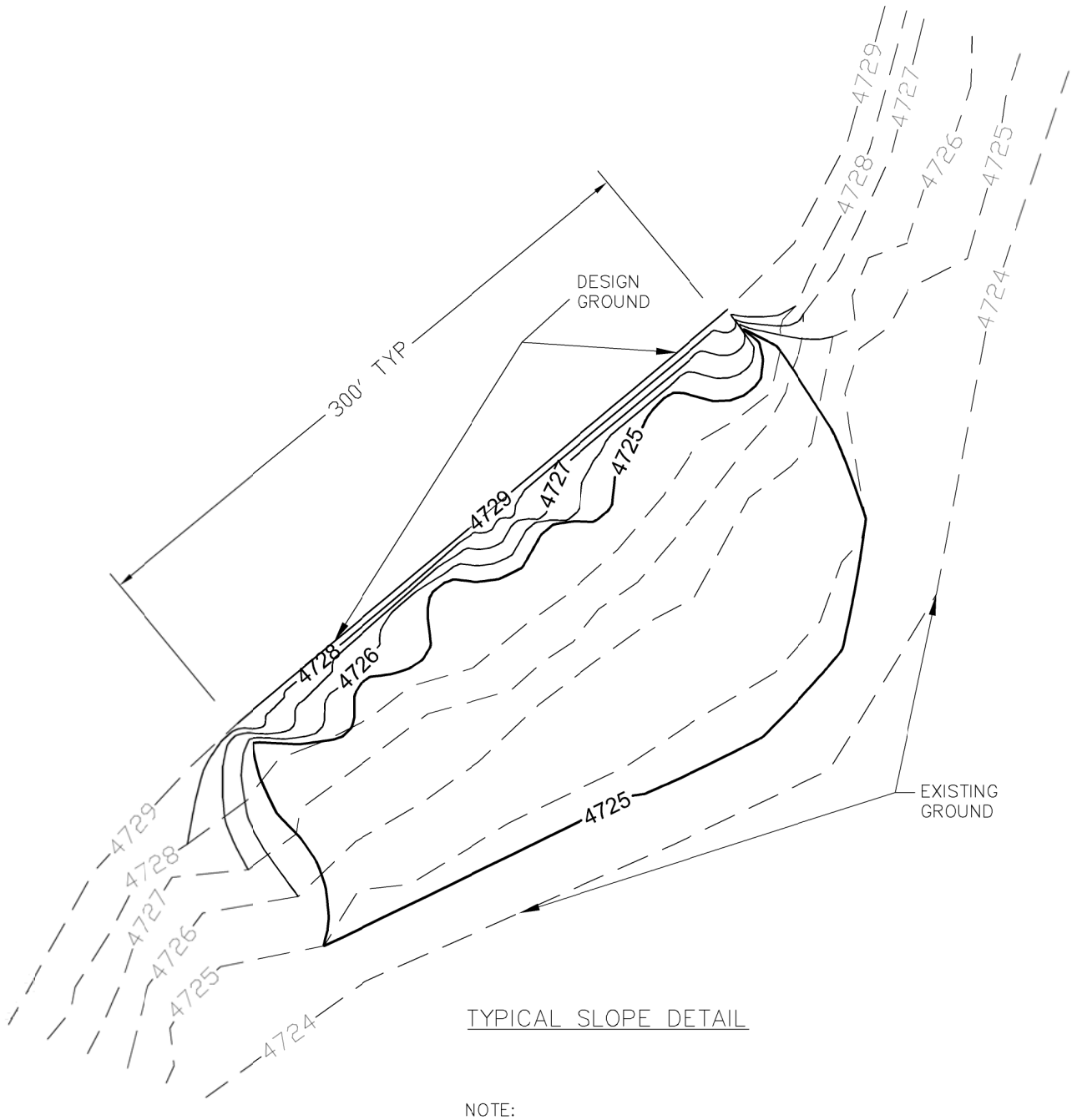
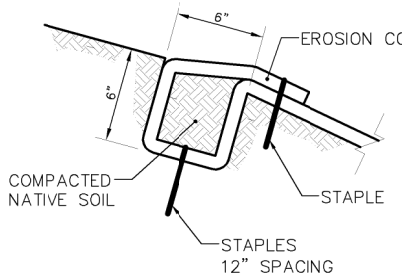


TYPICAL SLOPE DETAIL

NOTE:
1. VARY SLOPE GRADE FROM 2:1 TO 6:1.

NOTE:
FOR CHANNEL BANK APPLICATIONS, INCREASE TRENCH DIMENSIONS BY FACTOR OF 3.



DETAIL A
ANCHOR TRENCH
AT TOP OF SLOPE

NOTE:
1. INSTALL STAPLES ACCORDING TO THE MANUFACTURER'S RECOMMENDATIONS.
2. OVERLAP IN THE DIRECTION OF THE PREVAILING WIND OR FLOW.

PERSPECTIVE VIEW

DETAIL A
ANCHOR TRENCH
AT TOE OF SLOPE

DETAIL C
SHINGLE SPLICE

NOTES:

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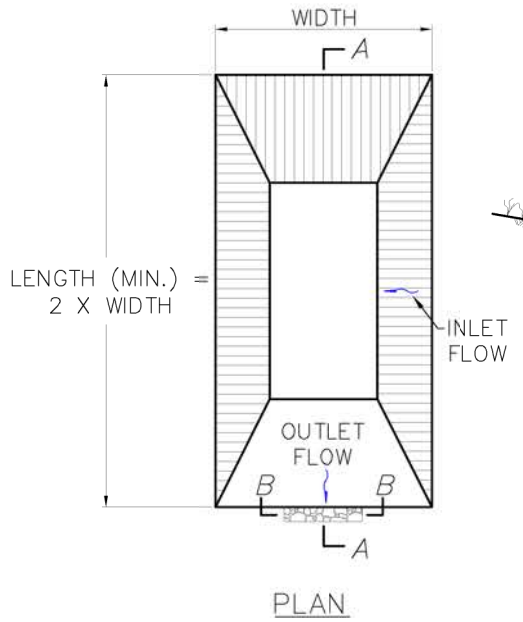
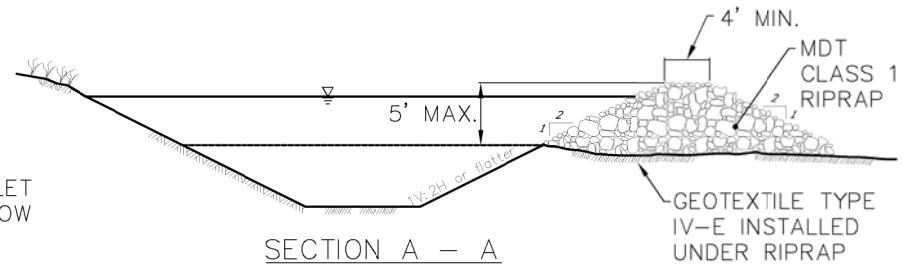
STORY MILL RESTORATION
TYPICAL DETAILS
TYPICAL BANK GRADING & EROSION CONTROL

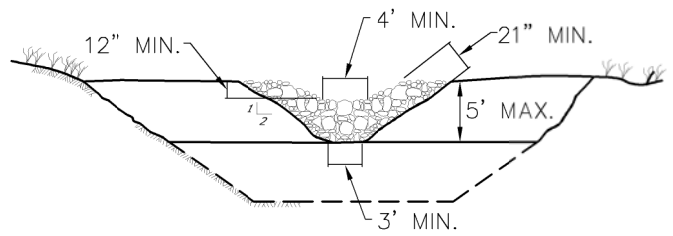
		DATE: 05/2014	
DR.: JR	REFIN. JOB#: 02274	RSI DWG NO. _DES01_Details_100.dwg	REV. --
CH.: MR	SCALE: NTS		
AP.: RM	SHEET: C-25		



PLAN



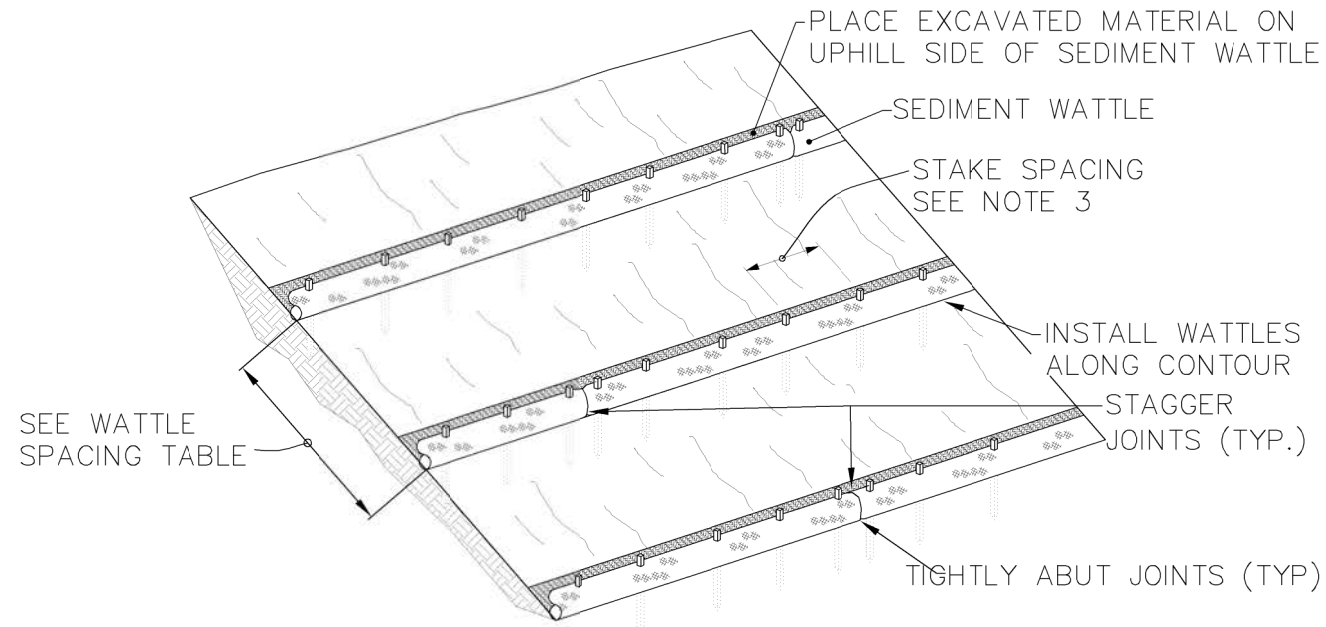
SECTION A – A



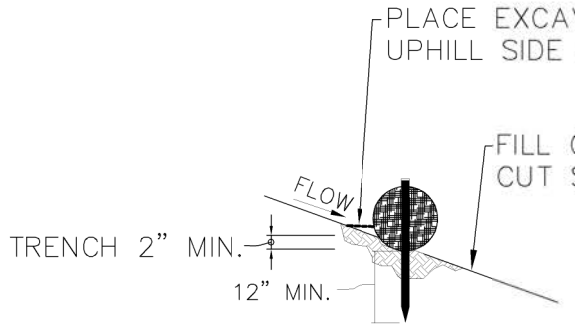
SECTION B – B

SEDIMENT TRAP

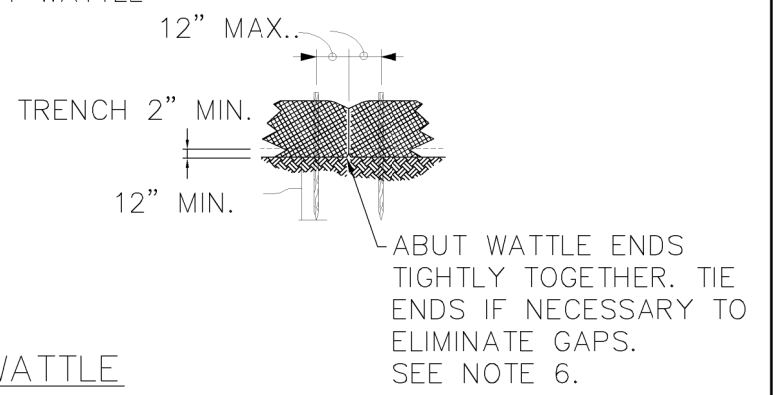
NOTE:
1. CLEAR, GRUB, AND REMOVE ALL VEGETATIVE MATTER INCLUDING ROOT MAT BEFORE CONSTRUCTING SEDIMENT TRAP.
2. REMOVE SEDIMENT FROM SEDIMENT TRAP AS IT ACCUMULATES AND PLACE AS APPROVED BY THE CO.
3. MAINTAIN A PROPERLY FUNCTIONING SEDIMENT TRAP THROUGHOUT CONSTRUCTION OR UNTIL DISTURBED AREAS CONTRIBUTING TO THE BASIN HAVE BEEN SEEDED.
4. DO NOT USE SEDIMENT TRAPS FOR DRAINAGE AREAS OVER 5 ACRES.
5. ADJUST SHAPE OF SEDIMENT TRAP TO FIT SITE SPECIFIC CONDITIONS.
6. ONCE CONTRIBUTING AREA IS SEEDED, RECLAIM SEDIMENT TRAP AREA AND INSTALL ENVIROGRID AND SEED ACCORDING TO SPECIFICATIONS.



SLOPE LAYOUT



STAKE DETAIL



WATTLE JOINT DETAIL

SEDIMENT WATTLE

NOTE:
1. REPAIR ALL RILLS OR GULLIES PRIOR TO INSTALLATION.
2. INSTALL SEDIMENT WATTLES ALONG SLOPE CONTOURS. FOR ANY 20' SECTION OF SEDIMENT WATTLE, DO NOT ALLOW THE SEDIMENT WATTLE TO VARY MORE THAN 5% FROM LEVEL.
3. STAKE SEDIMENT WATTLES IN PLACE WITH 1" x 1" OR 1"ø WOOD STAKES. SPACE STAKES 4' O.C. MAX. STAKE SEDIMENT WATTLES AT EACH END.
4. DRIVE STAKES INTO UNDISTURBED SOIL AT LEAST 12" DEEP. EXPOSE STAKES 2" ABOVE TOP OF WATTLE.
5. FOR SEDIMENT WATTLES ON BARE SOIL, CONSTRUCT TRENCHES PARALLEL TO THE CONTOUR. PLACE SEDIMENT WATTLES IN CONTINUOUS CONTACT WITH TRENCH BOTTOM AND SIDES. TAMP SOIL BACKFILL AGAINST UPSTREAM SIDE OF WATTLE TO ENSURE STORM WATER IS FORCED TO FLOW THROUGH WATTLE RATHER THAN UNDER IT.
6. SEDIMENT WATTLES MAY BE OVERLAPPED ACCORDING TO THE MANUFACTURER'S RECOMMENDATION.

WATTLE SPACING TABLE	
SLOPE GRADIENT	12" ø WATTLE MAXIMUM SPACING (FT)
1V:4H OR FLATTER	60
1V:4H TO 1V:3H	45
1V:3H TO 1V:2H	30
1V:2H OR STEEPER	15

NOTES:

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STORY MILL RESTORATION
TYPICAL DETAILS
SEDIMENT TRAP AND WATTLE

		DATE: 05/2014	
DR.: JR	REFIN. JOB#: 02274	RSI DWG NO. _DES01_Details_100.dwg	REV. --
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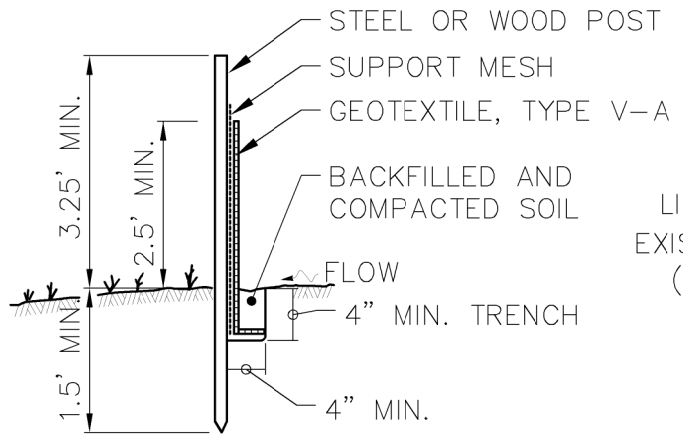
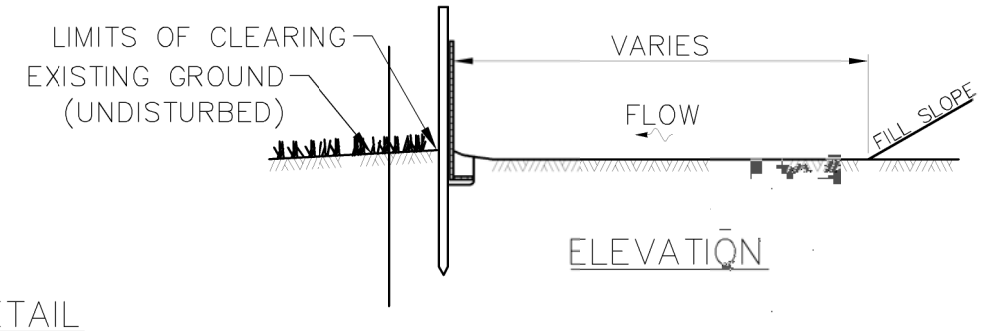
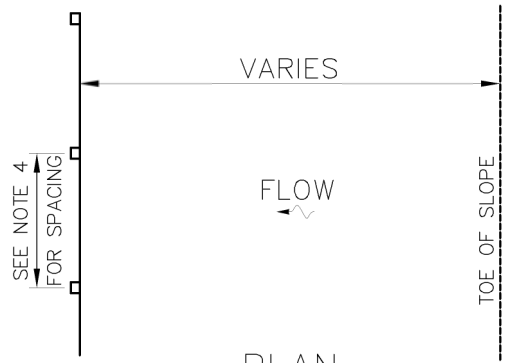
AP.: RM	SHEET: C-26		



POST AND GEOTEXTILE INSTALLATION DETAIL

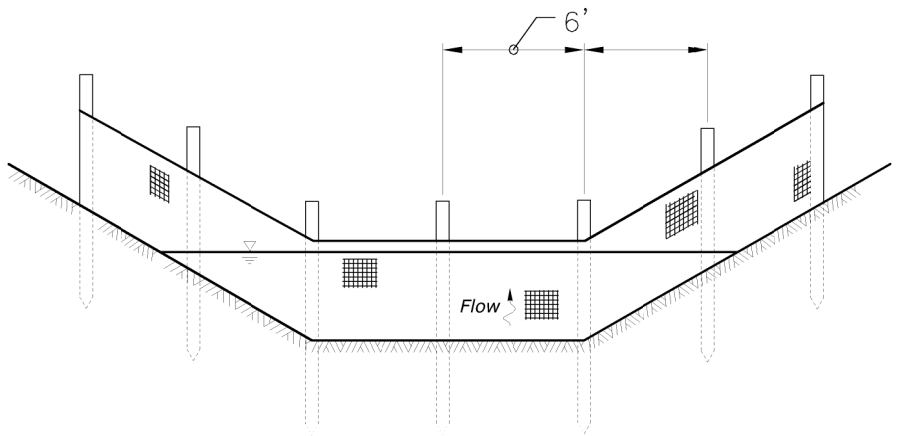


ELEVATION

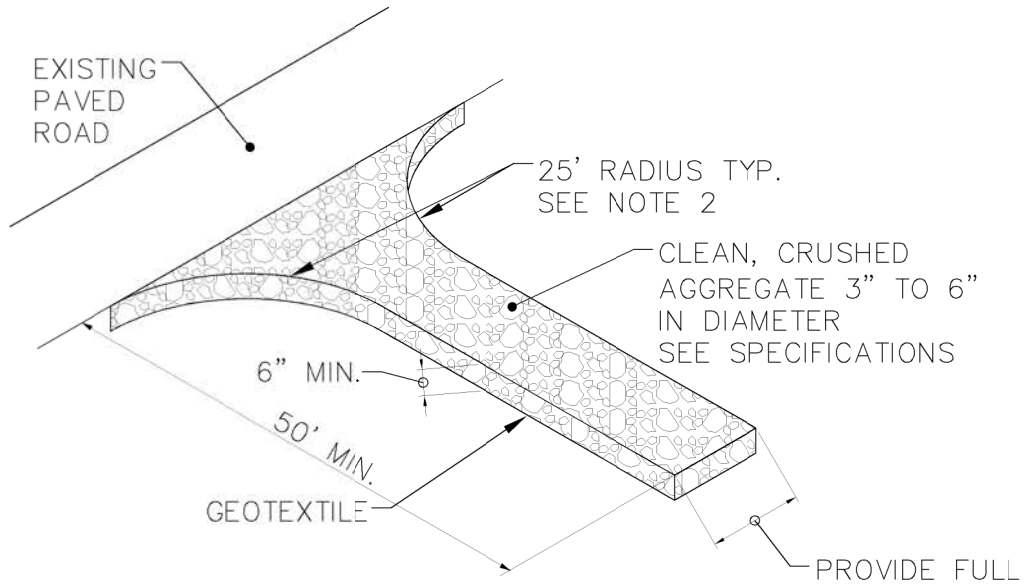


PLAN

SILT FENCE INSTALLATION AT TOE OF FILL



SILT FENCE INSTALLATION IN A DRAINAGE DITCH
SEE NOTE 1



STABILIZED CONSTRUCTION ENTRANCE

SILT FENCE

NOTE:
1. USE DRAINAGE DITCH INSTALLATION FOR LOW FLOW CONDITIONS ONLY WHEN SPECIFIED ON EROSION CONTROL PLAN.
2. ALTERNATE PREASSEMBLED SILT FENCE OPTIONS (GEOTEXTILE, TYPE V-B) WILL BE ALLOWED AS LONG AS SPECIFIED DIMENSIONS ARE SATISFIED. FOLLOW MANUFACTURER'S RECOMMENDATIONS FOR INSTALLATION PROCEDURES. ALL TYPES MUST ENSURE SILT FENCE REMAINS ATTACHED TO, AND DOES NOT SLIDE DOWN, SUPPORTING POSTS.
3. INSTALL SILT FENCING ALONG GROUND CONTOURS. CURVE ENDS OF SILT FENCE UPGRADE TO PREVENT WATER FROM RUNNING AROUND THE ENDS.
4. 6' SPACING WITH FENCE SUPPORT.

NOTE:
1. CONSTRUCT DRAINAGE DITCHES ALONG ENTRANCE AS DIRECTED BY THE CO. PROVIDE TEMPORARY DRAINAGE WHERE ENTRANCE CROSSES EXISTING DRAINAGE DITCHES.
2. CONSTRUCT RADIUS TO ALLOW TURNING MOVEMENT OF TYPICAL TRUCK USING EXIT.
3. REMOVE BUILD-UP OF SEDIMENT AS NECESSARY TO REDUCE TRACKING ONTO PAVED ROADWAY.

NOTES:

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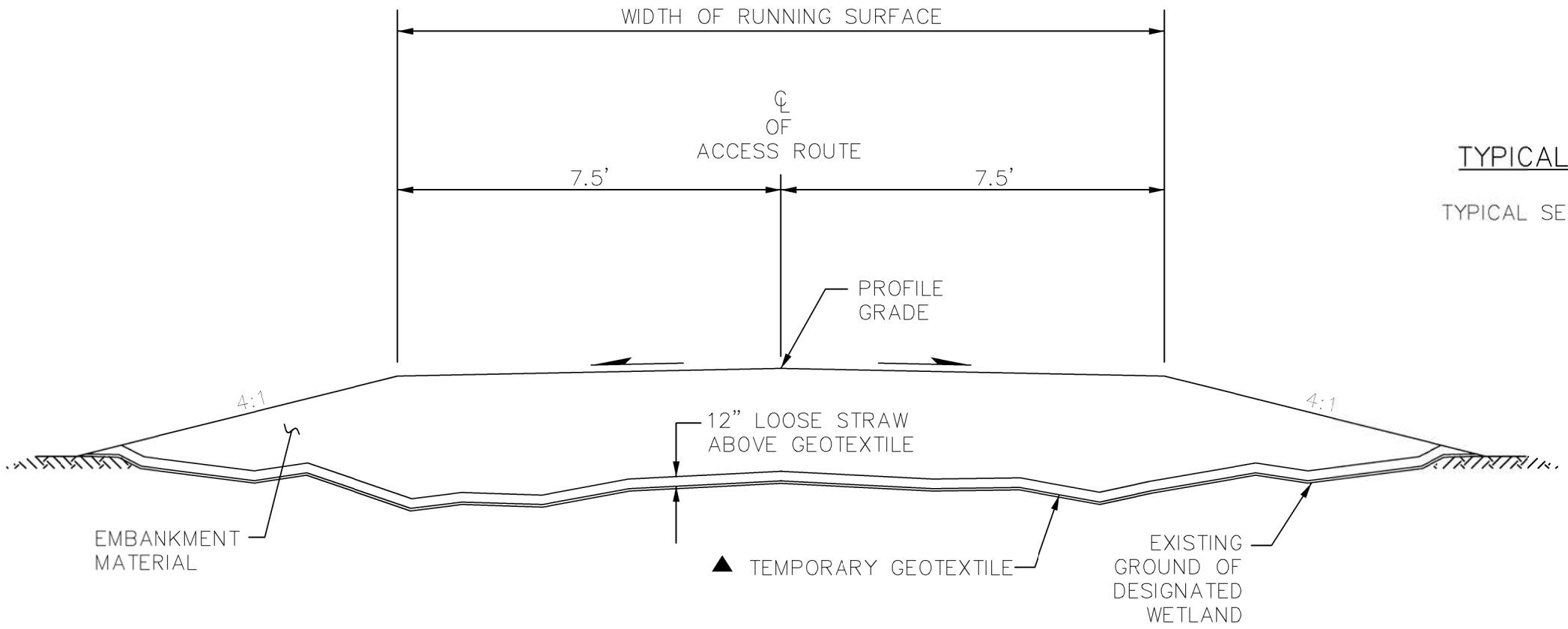
STORY MILL RESTORATION
TYPICAL DETAILS
SILT FENCE AND CONSTRUCTION ENTRANCE

		DATE: 05/2014	
DR.: JR	REFIN. JOB#: 02274	RSI DWG NO. _DES01_Details_100.dwg	REV. --
CH.: MR	SCALE: NTS		
AP.: RM	SHEET: C-27		



TYPICAL SECTION NOTES

TYPICAL SECTION IS NOT TO SCALE.

TEMPORARY WETLAND CROSSING TYPICAL SECTION

▲ THE AREAS SHALL BE PROTECTED WITH GEOTEXTILE FABRIC. ABOVE THE GEOTEXTILE PLACE A 12 INCH LAYER OF LOOSE STRAW AND A MINIMUM OF 2 FEET OF SOIL. AFTER CONSTRUCTION ACTIVITIES ARE COMPLETE, SOIL, STRAW AND GEOTEXTILE SHALL BE CAREFULLY REMOVED, AS DIRECTED. THE FINAL LIFT SHALL BE REMOVED USING A TOOTHLESS BACKHOE. STRAW AND GEOTEXTILE SHALL BECOME THE PROPERTY OF THE CONTRACTOR AND SHALL BE REMOVED FROM THE SITE. EXCESS FILL SHALL NOT BE WASTED IN WETLAND OR CREEK FLOODPLAIN AREAS.

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STORY MILL RESTORATION
TYPICAL DETAILS
TEMPORARY WETLAND CROSSING

		DATE: 05/2014	
DR.: JR	REFIN. JOB#: 02274	RSI DWG NO. _DES01_Details_100.dwg	REV. --
CH.: MR	SCALE: NTS		
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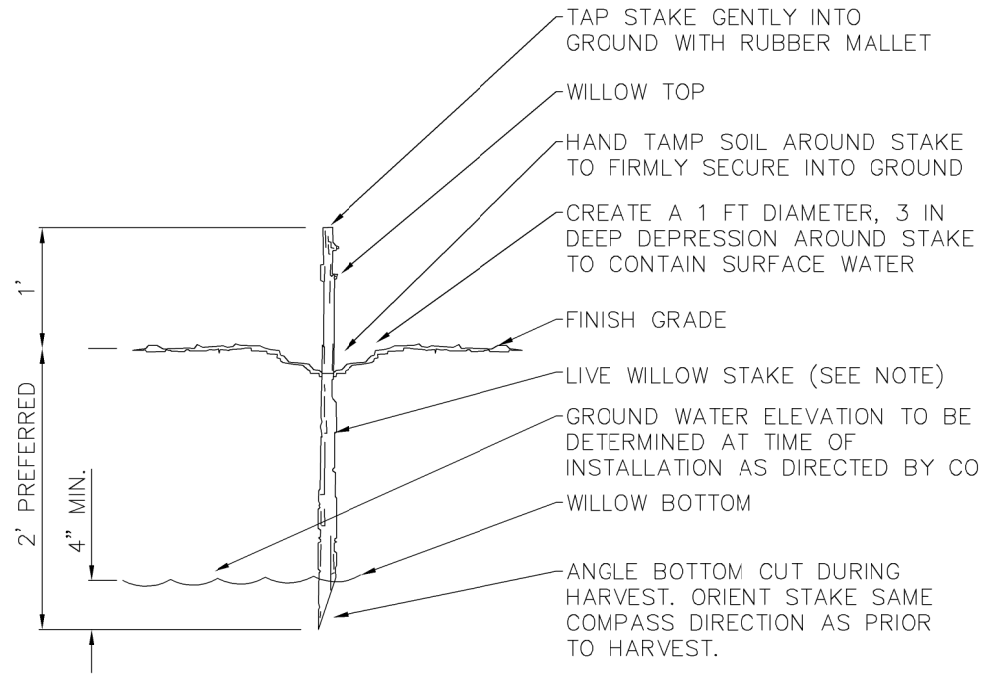

TYPICAL WILLOW STAKE PLANTING SECTION

WILLOW STAKE LENGTH MAY VARY BETWEEN 3 FT AND 5 FT. THE WILLOW STAKE BOTTOM END SHALL PENETRATE GROUND WATER AT A MINIMUM OF 4 IN REGARDLESS OF LENGTH. DO NOT FORCE WILLOW STAKES INTO GROUND WITHOUT PROVIDING AND APPROPRIATE SIZE PLANTING HOLE.

Riparian Seed Mix

	Scientific Name	Common Name	% of Mix	lbs PLS/ Acre	Cost per PLS Pound	Estimated Cost/Acre
1	*Agropyron lanceolatus*	thickspike wheatgrass	27.78%	4	$8.00	$32.00
2	*Agropyron smithii*	western wheatgrass	27.78%	4	$7.50	$30.00
3	*Agropyron trachycaulum*	slender wheatgrass	13.89%	2	$5.00	$10.00
4	*Deschampsia cespitosa*	tufted hairgrass	6.25%	0.9	$18.50	$7.40
5	*Elymus canadensis*	Canada wildrye	13.89%	2	$12.00	$24.00
6	*Elymus glaucus*	blue wildrye	10.42%	1.5	$9.00	$13.50
	TOTAL		**100%**	**14.4**	**--**	**$126.15**

Table Notes: lbs=pounds; PLS=pure live seed.

Costs are preliminary and are subject to change based on availability.

Upland Seed Mix

Wetland Seed Mix

	Scientific Name	Common Name	% of Mix	lbs PLS/ Acre	Cost per PLS Pound	Estimated Cost/Acre
1	*Beckmannia syzigachne*	American slough grass	17.86%	1	$25.00	$25.00
2	*Carex nebrascensis*	Nebraska sedge	17.86%	1	$85.00	$85.00
3	*Carex praegracilis*	clustered field sedge	7.14%	0.4	$95.00	$38.00
4	*Deschampsia cespitosa*	tufted hairgrass	7.14%	0.4	$18.50	$7.40
5	*Eleocharis palustris*	common spikerush	17.86%	1	$150.00	$150.00
6	*Glyceria grandis*	reed mannagrass	7.14%	0.4	$90.00	$36.00
7	*Juncus balticus*	Baltic rush	3.57%	0.2	$150.00	$30.00
8	*Scirpus acutus*	hard-stem bulrush	17.86%	1	$60.00	$60.00
9	*Scirpus microcarpus*	small-fruited bulrush	3.57%	0.2	$105.00	$21.00
	TOTAL		100%	5.6	--	$452.00

Table Notes: lbs=pounds; PLS=pure live seed.

Costs are preliminary and are subject to change based on availability.

Upland Seed Mix

	Scientific Name	Common Name	% of Mix	lbs PLS/ Acre	Cost per PLS Pound	Estimated Cost/Acre
1	*Stipa viridula*	green needlegrass	11.76%	2	$7.75	$15.50
2	*Stipa comata*	needle-n-thread	5.88%	1	$70.00	$70.00
3	*Elymus canadensis*	Canada wildrye	11.76%	2	$12.00	$24.00
4	*Elymus glaucus*	blue wildrye	8.82%	1.5	$9.00	$13.50
5	*Agropyron lanceolatus*	thickspike wheatgrass	11.76%	2	$8.00	$16.00
6	*Agropyron smithii*	western wheatgrass	11.76%	2	$7.50	$15.00
7	*Agropyron (Elymus) trachycaulum*	slender wheatgrass	5.88%	1	$5.00	$5.00
8	*Bromus marginatus*	mountain brome	23.53%	4	$6.50	$26.00
9	*Poa secunda*	Sandberg's bluegrass	2.94%	0.5	$9.00	$4.50
10	*Oryzopsis hymenoides*	Indian ricegrass, Rimrock	5.88%	1	$12.50	$12.50
	TOTAL		**100%**	**17**	**--**	**$202.00**

Table Notes: lbs=pounds; PLS=pure live seed.

Costs are preliminary and are subject to change based on availability.

NOTES:

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STORY MILL RESTORATION
PLANTING DETAILS

DR.: JR | REFIN. JOB#: 02274 | DATE: 05/2014
CH.: MR | SCALE: NTS | RSI DWG NO. _DES01_Details_100.dwg | REV. --
AP.: RM | SHEET: P-08